



Federal Implementation Guideline for Electronic Data Interchange

ASC X12 003060 Transaction Set 846F
Inventory Inquiry/Advice
(Ammo Freeze/Unfreeze)

Implementation Convention



U.S. DEPARTMENT OF COMMERCE
Technology Administration
National Institute of
Standards and Technology

QC
100
.U57
NO.881-69
1998

The National Institute of Standards and Technology was established in 1988 by Congress to “assist industry in the development of technology . . . needed to improve product quality, to modernize manufacturing processes, to ensure product reliability . . . and to facilitate rapid commercialization . . . of products based on new scientific discoveries.”

NIST, originally founded as the National Bureau of Standards in 1901, works to strengthen U.S. industry’s competitiveness; advance science and engineering; and improve public health, safety, and the environment. One of the agency’s basic functions is to develop, maintain, and retain custody of the national standards of measurement, and provide the means and methods for comparing standards used in science, engineering, manufacturing, commerce, industry, and education with the standards adopted or recognized by the Federal Government.

As an agency of the U.S. Commerce Department’s Technology Administration, NIST conducts basic and applied research in the physical sciences and engineering, and develops measurement techniques, test methods, standards, and related services. The Institute does generic and precompetitive work on new and advanced technologies. NIST’s research facilities are located at Gaithersburg, MD 20899, and at Boulder, CO 80303. Major technical operating units and their principal activities are listed below. For more information contact the Publications and Program Inquiries Desk, 301-975-3058.

Office of the Director

- National Quality Program
- International and Academic Affairs

Technology Services

- Standards Services
- Technology Partnerships
- Measurement Services
- Technology Innovation
- Information Services

Advanced Technology Program

- Economic Assessment
- Information Technology and Applications
- Chemical and Biomedical Technology
- Materials and Manufacturing Technology
- Electronics and Photonics Technology

Manufacturing Extension Partnership Program

- Regional Programs
- National Programs
- Program Development

Electronics and Electrical Engineering Laboratory

- Microelectronics
- Law Enforcement Standards
- Electricity
- Semiconductor Electronics
- Electromagnetic Fields¹
- Electromagnetic Technology¹
- Optoelectronics¹

Chemical Science and Technology Laboratory

- Biotechnology
- Physical and Chemical Properties²
- Analytical Chemistry
- Process Measurements
- Surface and Microanalysis Science

Physics Laboratory

- Electron and Optical Physics
- Atomic Physics
- Optical Technology
- Ionizing Radiation
- Time and Frequency¹
- Quantum Physics¹

Materials Science and Engineering Laboratory

- Intelligent Processing of Materials
- Ceramics
- Materials Reliability¹
- Polymers
- Metallurgy
- NIST Center for Neutron Research

Manufacturing Engineering Laboratory

- Precision Engineering
- Automated Production Technology
- Intelligent Systems
- Fabrication Technology
- Manufacturing Systems Integration

Building and Fire Research Laboratory

- Structures
- Building Materials
- Building Environment
- Fire Safety Engineering
- Fire Science

Information Technology Laboratory

- Mathematical and Computational Sciences²
- Advanced Network Technologies
- Computer Security
- Information Access and User Interfaces
- High Performance Systems and Services
- Distributed Computing and Information Services
- Software Diagnostics and Conformance Testing

¹ At Boulder, CO 80303.

² Some elements at Boulder, CO.

Federal Implementation Guideline for Electronic Data Interchange

ASC X12 003060 Transaction Set 846F Inventory Inquiry/Advice (Ammo Freeze/Unfreeze)

Implementation Convention

Electronic Commerce Acquisition Program Management Office
Standard Management Committee - Secretariat
National Institute of Standards and Technology
Gaithersburg, MD 20899-0001

Editor: Dr. Jean-Philippe Favreau

August 1998



U.S. DEPARTMENT OF COMMERCE
William M. Daley, Secretary

Technology Administration
Gary R. Bachula, Acting Under Secretary for Technology

National Institute of Standards and Technology
Raymond G. Kammer, Director

Reports on Information Technology

The National Institute of Standards and Technology (NIST)'s Information Technology Laboratory (ITL) develops standards and guidelines, provides technical assistance, and conducts research for computers and resources. As part of the overall federal effort to establish a single face to industry for conducting electronic commerce, ITL has been designated as the organization responsible for coordinating the development of Federal Implementation Conventions (ICs) for Electronic Data Interchange (EDI). ICs are defined by functional-area experts who create and select options from standard EDI Transaction Sets to yield the implementations to be used for practical EDI. These ICs are made available to federal agencies and industry by electronic means and this Special Publication Series.

National Institute of Standards and Technology Special Publication 881-69
Natl. Inst. Stand. Technol. Spec. Publ. 881-69, 28 pages (Aug. 1998)
CODEN: NSPUE2

U.S. GOVERNMENT PRINTING OFFICE
WASHINGTON: 1998

846 Inventory Inquiry/Advice

Functional Group ID=**IB**

Introduction:

This Draft Standard for Trial Use contains the format and establishes the data contents of the Inventory Inquiry/Advice Transaction Set (846) for use within the context of an Electronic Data Interchange (EDI) environment. The transaction set can be used in the following ways: (1) for a seller of goods and services to provide inventory information to a prospective purchaser, with no obligation to the purchaser to acquire these goods or services; (2) for a representative of a seller of goods and services to supply inventory information to that seller; (3) for one location to supply another location with inventory information; and (4) for an inquiry as to the availability of inventory with no obligation on the seller of goods and services to reserve that inventory.

Notes:

- 1. The Single Manager for Conventional Ammunition (SMCA) uses this transaction set to advise storage organizations of freeze or unfreeze actions on conventional ammunition.*
- 2. Use a single occurrence of this transaction set to exchange transactions between the SMCA and a single or multiple storage organizations. Use one occurrence of this transaction set to transmit a single or multiple transactions.*
- 3. Users operating under the Defense Logistics Management System (DLMS) must reference the Unit of Issue and Purchase Unit Conversion Table which can be found on the National Institute of Standards and Technology (NIST) World Wide Web Site.*

Heading:

	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
Must Use	010	ST	Transaction Set Header	M	1		
Must Use	020	BIA	Beginning Segment for Inventory Inquiry/Advice	M	1		
Not Used	040	CUR	Currency	O	1		
Not Used	050	DTM	Date/Time Reference	O	10		
Not Used	060	REF	Reference Identification	O	12		
Not Used	070	PER	Administrative Communications Contact	O	3		
Not Used	075	MEA	Measurements	O	20		
LOOP ID - N1						5	
Must Use	080	N1	Name	O	1		
Not Used	090	N2	Additional Name Information	O	2		
Not Used	100	N3	Address Information	O	2		
Not Used	110	N4	Geographic Location	O	1		
Not Used	120	REF	Reference Identification	O	12		
Not Used	130	PER	Administrative Communications Contact	O	3		
LOOP ID - LM						10	
Must Use	140	LM	Code Source Information	O	1		
Must Use	150	LQ	Industry Code	M	100		

Detail:

846F - Inventory Inquiry/Advice (Ammo Freeze/Unfreeze)

	<u>Pos. No.</u>	<u>Seg. ID</u>	<u>Name</u>	<u>Req. Des.</u>	<u>Max.Use</u>	<u>Loop Repeat</u>	<u>Notes and Comments</u>
			LOOP ID - LIN			10000	
Must Use	010	LIN	Item Identification	M	1		
Not Used	030	PID	Product/Item Description	O	200		
Not Used	040	MEA	Measurements	O	40		
Not Used	050	PKG	Marking, Packaging, Loading	O	25		
	100	DTM	Date/Time Reference	O	10		
Not Used	110	CTP	Pricing Information	O	25		
Not Used	120	CUR	Currency	O	1		
Not Used	130	SAC	Service, Promotion, Allowance, or Charge Information	O	25		
Must Use	140	REF	Reference Identification	O	>1		
Not Used	150	PER	Administrative Communications Contact	O	3		
Not Used	220	SDQ	Destination Quantity	O	500		
Not Used	230	MAN	Marks and Numbers	O	1		
Not Used	235	UIT	Unit Detail	O	5		
Not Used	240	CS	Contract Summary	O	1		
Not Used	250	DD	Demand Detail	O	>1		
Not Used	255	G53	Maintenance Type	O	1		
Not Used	256	PCT	Percent Amounts	O	>1		
Not Used	257	LDT	Lead Time	O	12		
			LOOP ID - LM			10	
	260	LM	Code Source Information	O	1		
Must Use	270	LQ	Industry Code	M	100		
			LOOP ID - SLN			1000	
Not Used	280	SLN	Subline Item Detail	O	1		
Not Used	290	PID	Product/Item Description	O	200		
Not Used	300	MEA	Measurements	O	40		
Not Used	310	PKG	Marking, Packaging, Loading	O	25		
			LOOP ID - MAN			100	
Not Used	312	MAN	Marks and Numbers	O	1		
Not Used	314	MEA	Measurements	O	40		
			LOOP ID - QTY			99	
	320	QTY	Quantity	O	1		
Not Used	330	UIT	Unit Detail	O	12		
Not Used	340	MEA	Measurements	O	25		
Not Used	350	LDT	Lead Time	O	12		
Not Used	355	DTM	Date/Time Reference	O	10		
			LOOP ID - SCH			25	
Not Used	360	SCH	Line Item Schedule	O	1		
Not Used	370	MEA	Measurements	O	25		
			LOOP ID - LM			>1	
	375	LM	Code Source Information	O	1		
Must Use	376	LQ	Industry Code	M	100		
	380	LS	Loop Header	O	1		
			LOOP ID - REF			>1	
	390	REF	Reference Identification	O	1		n1

846F - Inventory Inquiry/Advice (Ammo Freeze/Unfreeze)

	400	DTM	Date/Time Reference	O	>1	
	410	N1	Name	O	1	
			LOOP ID - LM		10	
Not Used	420	LM	Code Source Information	O	1	
Not Used	430	LQ	Industry Code	M	100	
	440	LE	Loop Trailer	O	1	
			LOOP ID - N1		200	
Must Use	450	N1	Name	O	1	
Not Used	460	N2	Additional Name Information	O	2	
Not Used	470	N3	Address Information	O	2	
Not Used	480	N4	Geographic Location	O	1	
Not Used	490	REF	Reference Identification	O	12	
Not Used	500	PER	Administrative Communications Contact	O	3	

Summary:

	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
Not Used	010	CTT	Transaction Totals	O	1		n2
Must Use	020	SE	Transaction Set Trailer	M	1		

Transaction Set Notes

1. The REF loop conveys serial number, lot number, and inventory data.
2. Number of line items (CTT01) is the accumulation of number of LIN segments. If used, hash total (CTT02) is the sum of the values of the quantities (QTY02) of each QTY segment.

Segment: **ST** Transaction Set Header
Position: 010
Loop:
Level: Heading
Usage: Mandatory
Max Use: 1
Purpose: To indicate the start of a transaction set and to assign a control number
Syntax Notes:
Semantic Notes: 1 The transaction set identifier (ST01) used by the translation routines of the interchange partners to select the appropriate transaction set definition (e.g., 810 selects the Invoice Transaction Set).
Comments:

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	ST01	143	Transaction Set Identifier Code Code uniquely identifying a Transaction Set 846 X12.28 Inventory Inquiry/Advice	M ID 3/3
Must Use	ST02	329	Transaction Set Control Number Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set <i>A unique number assigned by the originator of the transaction set, or the originator's application program.</i>	M AN 4/9

Segment: **BIA** Beginning Segment for Inventory Inquiry/Advice
Position: 020
Loop:
Level: Heading
Usage: Mandatory
Max Use: 1
Purpose: To indicate the beginning of an Inventory Inquiry/Advice Transaction Set
Syntax Notes:
Semantic Notes:

- 1 BIA03 identifies the number of the inquiry/advice that is transferred.
- 2 BIA04 identifies the date of the inquiry/advice that is transferred.
- 3 BIA05 identifies the time of the inquiry/advice that is transferred.

Comments:

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	BIA01	353	Transaction Set Purpose Code Code identifying purpose of transaction set	M ID 2/2
			00 Original	
			77 Simulation Exercise	
			<i>Use to identify a simulated mobilization exercise transaction set. Activities initiating simulated mobilization exercises must ensure complete coordination with all activities involved. All transaction set recipients must use extreme caution to ensure that individual transactions do not process as action documents which affect accountable records.</i>	
Must Use	BIA02	755	Report Type Code Code indicating the title or contents of a document, report or supporting item	M ID 2/2
			ZB Conventional Ammunition Suspension Report	
			An action that suspends or freezes continued use of a specified quantity of conventional ammunition	
			<i>Use to identify a conventional ammunition freeze/unfreeze transaction.</i>	
Must Use	BIA03	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	M AN 1/30
			<i>Use Code "Z" for this data element to satisfy mandatory X12 syntax requirements.</i>	
Must Use	BIA04	373	Date Date (YYMMDD)	M DT 6/6
			<i>This is the date of transaction set preparation. This date corresponds to the Universal Time Coordinate (UTC).</i>	
Must Use	BIA05	337	Time Time expressed in 24-hour clock time as follows: HHMM, or HHMMSS, or HHMMSSD, or HHMMSSDD, where H = hours (00-23), M = minutes (00-59), S = integer seconds (00-59) and DD = decimal seconds; decimal seconds are expressed as follows: D = tenths (0-9) and DD = hundredths (00-99)	O TM 4/8
			<i>1. Express the originating activity's time of transaction set preparation in UTC.</i>	
			<i>2. Express time in a four-position (HHMM) format.</i>	
Not Used	BIA06	306	Action Code Code indicating type of action	O ID 1/2

Segment: **N1** Name
Position: 080
Loop: N1 Optional (Must Use)
Level: Heading
Usage: Optional (Must Use)
Max Use: 1
Purpose: To identify a party by type of organization, name, and code
Syntax Notes: 1 At least one of N102 or N103 is required.
 2 If either N103 or N104 is present, then the other is required.
Semantic Notes:
Comments: 1 This segment, used alone, provides the most efficient method of providing organizational identification. To obtain this efficiency the "ID Code" (N104) must provide a key to the table maintained by the transaction processing party.
 2 N105 and N106 further define the type of entity in N101.
Notes: *Must use this 1/N1/080 loop to identify SMCA originating the transaction set.*

Data Element Summary

Ref.	Des.	Data Element	Name	Attributes
Must Use	N101	98	Entity Identifier Code Code identifying an organizational entity, a physical location, or an individual KA Item Manager The address of the person responsible for the management of an item of supply <i>Must use to identify the SMCA.</i>	M ID 2/2
Not Used	N102	93	Name Free-form name	X AN 1/35
Must Use	N103	66	Identification Code Qualifier Code designating the system/method of code structure used for Identification Code (67) 1 D-U-N-S Number, Dun & Bradstreet 9 D-U-N-S+4, D-U-N-S Number with Four Character Suffix 10 Department of Defense Activity Address Code (DODAAC) M4 Department of Defense Routing Identifier Code (RIC) An integral and predetermined participant in an established logistical system performing general logistic control, distribution, and storage functions	X ID 1/2
Must Use	N104	67	Identification Code Code identifying a party or other code	X AN 2/20
Not Used	N105	706	Entity Relationship Code Code describing entity relationship	O ID 2/2
Must Use	N106	98	Entity Identifier Code Code identifying an organizational entity, a physical location, or an individual FR Message From <i>Must use to indicate the organization cited in N104 is originating the transaction set.</i>	O ID 2/2

Segment: **LM** Code Source Information
Position: 140
Loop: LM Optional (Must Use)
Level: Heading
Usage: Optional (Must Use)
Max Use: 1
Purpose: To transmit standard code list identification information
Syntax Notes:
Semantic Notes:
Comments: 1 LM02 identifies the applicable industry code list source information.
Notes: *Must use this 1/LM/140 loop to identify coded information maintained in department or agency documentation.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	LM01	559	Agency Qualifier Code Code identifying the agency assigning the code values DF Department of Defense (DoD)	M ID 2/2
Not Used	LM02	822	Source Subqualifier A reference that indicates the table or text maintained by the Source Qualifier	O AN 1/15

Segment: **LQ** Industry Code
Position: 150
Loop: LM Optional (Must Use)
Level: Heading
Usage: Mandatory
Max Use: 100
Purpose: Code to transmit standard industry codes
Syntax Notes: 1 If LQ01 is present, then LQ02 is required.
Semantic Notes:
Comments:
Notes: *Use to identify codes, as appropriate, consistent with management information requirements.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	LQ01	1270	Code List Qualifier Code Code identifying a specific industry code list 0 Document Identification Code Codes that subclassify a transaction	O ID 1/3
Must Use	LQ02	1271	Industry Code Code indicating a code from a specific industry code list	X AN 1/30

Segment:	LIN	Item Identification
Position:	010	
Loop:	LIN	Mandatory
Level:	Detail	
Usage:	Mandatory	
Max Use:	1	
Purpose:	To specify basic item identification data	
Syntax Notes:	1 If either LIN04 or LIN05 is present, then the other is required. 2 If either LIN06 or LIN07 is present, then the other is required. 3 If either LIN08 or LIN09 is present, then the other is required. 4 If either LIN10 or LIN11 is present, then the other is required. 5 If either LIN12 or LIN13 is present, then the other is required. 6 If either LIN14 or LIN15 is present, then the other is required. 7 If either LIN16 or LIN17 is present, then the other is required. 8 If either LIN18 or LIN19 is present, then the other is required. 9 If either LIN20 or LIN21 is present, then the other is required. 10 If either LIN22 or LIN23 is present, then the other is required. 11 If either LIN24 or LIN25 is present, then the other is required. 12 If either LIN26 or LIN27 is present, then the other is required. 13 If either LIN28 or LIN29 is present, then the other is required. 14 If either LIN30 or LIN31 is present, then the other is required.	
Semantic Notes:	1 LIN01 is the line item identification	
Comments:	1 See the Data Dictionary for a complete list of IDs. 2 LIN02 through LIN31 provide for fifteen different product/service IDs for each item. For example: Case, Color, Drawing No., U.P.C. No., ISBN No., Model No., or SKU.	
Notes:	<i>Must use the 2/LIN/010 loop to identify the material, transaction number, and inventory information associated with the freeze/unfreeze action.</i>	

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Not Used	LIN01	350	Assigned Identification Alphanumeric characters assigned for differentiation within a transaction set	O AN 1/20
Must Use	LIN02	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234) <i>Use only one of codes A2, FS or MG to identify the ammunition item.</i> A2 Department of Defense Identification Code (DoDIC) Qualifies a code that uniquely identifies a type of explosive or ammunition <i>Use to identify ammunition items.</i> FS National Stock Number MG Manufacturer's Part Number <i>Use to identify the ammunition manufacturer's part number when no DoDIC is assigned.</i>	M ID 2/2
Must Use	LIN03	234	Product/Service ID Identifying number for a product or service	M AN 1/40
	LIN04	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234) ZB Commercial and Government Entity (CAGE) Code A code that identifies a commercial contractor authorized to do business with the U.S. government <i>Use with LIN02 code MG to uniquely identify the ammunition manufacturer's part number.</i>	X ID 2/2

	LIN05	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN06	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN07	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN08	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN09	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN10	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN11	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN12	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN13	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN14	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN15	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN16	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN17	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN18	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN19	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN20	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN21	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN22	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN23	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN24	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN25	234	Product/Service ID Identifying number for a product or service	X	AN 1/40
Not Used	LIN26	235	Product/Service ID Qualifier Code identifying the type/source of the descriptive number used in Product/Service ID (234)	X	ID 2/2
Not Used	LIN27	234	Product/Service ID	X	AN 1/40

Not Used	LIN28	235	Identifying number for a product or service Product/Service ID Qualifier	X	ID 2/2
			Code identifying the type/source of the descriptive number used in Product/Service ID (234)		
Not Used	LIN29	234	Product/Service ID	X	AN 1/40
			Identifying number for a product or service		
Not Used	LIN30	235	Product/Service ID Qualifier	X	ID 2/2
			Code identifying the type/source of the descriptive number used in Product/Service ID (234)		
Not Used	LIN31	234	Product/Service ID	X	AN 1/40
			Identifying number for a product or service		

Segment: **DTM** Date/Time Reference
Position: 100
Loop: LIN Mandatory
Level: Detail
Usage: Optional
Max Use: 10
Purpose: To specify pertinent dates and times
Syntax Notes: 1 At least one of DTM02 DTM03 or DTM06 is required.
2 If either DTM06 or DTM07 is present, then the other is required.
Semantic Notes:
Comments:
Notes: *Must use 2/DTM/100 to identify dates associated with the transaction.*

Data Element Summary

	Ref.	Data	Name	Attributes
	<u>Des.</u>	<u>Element</u>		
Must Use	DTM01	374	Date/Time Qualifier Code specifying type of date or time, or both date and time	M ID 3/3
			168 Release <i>Use to identify the effective date ammunition is released from suspension.</i>	
			600 As Of <i>Use to identify the effective date ammunition is to be suspended from use or issue.</i>	
Must Use	DTM02	373	Date Date (YYMMDD)	X DT 6/6
Not Used	DTM03	337	Time Time expressed in 24-hour clock time as follows: HHMM, or HHMMSS, or HHMMSSD, or HHMMSSDD, where H = hours (00-23), M = minutes (00-59), S = integer seconds (00-59) and DD = decimal seconds; decimal seconds are expressed as follows: D = tenths (0-9) and DD = hundredths (00-99)	X TM 4/8
Not Used	DTM04	623	Time Code Code identifying the time. In accordance with International Standards Organization standard 8601, time can be specified by a + or - and an indication in hours in relation to Universal Time Coordinate (UTC) time; since + is a restricted character, + and - are substituted by P and M in the codes that follow	O ID 2/2
	DTM05	624	Century The first two characters in the designation of the year (CCYY)	O N0 2/2
Not Used	DTM06	1250	Date Time Period Format Qualifier Code indicating the date format, time format, or date and time format	X ID 2/3
Not Used	DTM07	1251	Date Time Period Expression of a date, a time, or range of dates, times or dates and times	X AN 1/35

Segment: **REF** Reference Identification
Position: 140
Loop: LIN Mandatory
Level: Detail
Usage: Optional (Must Use)
Max Use: >1
Purpose: To specify identifying information
Syntax Notes:

- 1 At least one of REF02 or REF03 is required.
- 2 If either C04003 or C04004 is present, then the other is required.
- 3 If either C04005 or C04006 is present, then the other is required.

Semantic Notes:

- 1 REF04 contains data relating to the value cited in REF02.

Comments:

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	REF01	128	Reference Identification Qualifier Code qualifying the Reference Identification TN Transaction Reference Number <i>Must use to identify the transaction number assigned to the transaction.</i>	M ID 2/3
Must Use	REF02	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	X AN 1/30
Not Used	REF03	352	Description A free-form description to clarify the related data elements and their content	X AN 1/80
Not Used	REF04	C040	Reference Identifier To identify one or more reference numbers or identification numbers as specified by the Reference Qualifier	O
Not Used	C04001	128	Reference Identification Qualifier Code qualifying the Reference Identification	M ID 2/3
Not Used	C04002	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	M AN 1/30
Not Used	C04003	128	Reference Identification Qualifier Code qualifying the Reference Identification	X ID 2/3
Not Used	C04004	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	X AN 1/30
Not Used	C04005	128	Reference Identification Qualifier Code qualifying the Reference Identification	X ID 2/3
Not Used	C04006	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	X AN 1/30

Segment: **LM** Code Source Information
Position: 260
Loop: LM Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To transmit standard code list identification information
Syntax Notes:
Semantic Notes:
Comments: 1 LM02 identifies the applicable industry code list source information.
Notes: *Use this 2/LM/260 loop to identify coded information in department or agency documentation.*

Data Element Summary

	Ref. Des.	Data Element	Name	Attributes
Must Use	LM01	559	Agency Qualifier Code Code identifying the agency assigning the code values DF Department of Defense (DoD)	M ID 2/2
Not Used	LM02	822	Source Subqualifier A reference that indicates the table or text maintained by the Source Qualifier	O AN 1/15

Segment: **LQ** Industry Code
Position: 270
Loop: LM Optional
Level: Detail
Usage: Mandatory
Max Use: 100
Purpose: Code to transmit standard industry codes
Syntax Notes: 1 If LQ01 is present, then LQ02 is required.
Semantic Notes:
Comments:
Notes: *Use to identify codes, as appropriate, consistent with management information requirements.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	LQ01	1270	Code List Qualifier Code Code identifying a specific industry code list 84 Management Code Supplemental information not covered by the transaction coding structure <i>Use to identify supplemental management information associated with the freeze/unfreeze action.</i>	O ID 1/3
Must Use	LQ02	1271	Industry Code Code indicating a code from a specific industry code list	X AN 1/30

Segment: QTY Quantity
Position: 320
Loop: QTY Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To specify quantity information
Syntax Notes:
Semantic Notes:
Comments:
Notes:

1. Use multiple iterations of the 2/QTY/320 loop to stratify quantity by material classification.

2. Use the 2/REF/390 loop as needed to identify Unique Item Tracking (UIT) information related to inventory quantities.

Data Element Summary

	<u>Ref.</u>	<u>Data</u>	<u>Name</u>	<u>Attributes</u>
	<u>Des.</u>	<u>Element</u>		
Must Use	QTY01	673	Quantity Qualifier Code specifying the type of quantity 01 Discrete Quantity <i>Use to identify the quantity suspended or released from suspension.</i>	M ID 2/2
Must Use	QTY02	380	Quantity Numeric value of quantity <i>Express as a whole number with no decimals.</i>	M R 1/15
	QTY03	C001	Composite Unit of Measure To identify a composite unit of measure (See Figures Appendix for examples of use)	O
Must Use	C00101	355	Unit or Basis for Measurement Code Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken <i>DLMS users see the Unit of Issue and Purchase Unit Conversion Table for applicable codes.</i>	M ID 2/2
Not Used	C00102	1018	Exponent Power to which a unit is raised	O R 1/15
Not Used	C00103	649	Multiplier Value to be used as a multiplier to obtain a new value	O R 1/10
Not Used	C00104	355	Unit or Basis for Measurement Code Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken	O ID 2/2
Not Used	C00105	1018	Exponent Power to which a unit is raised	O R 1/15
Not Used	C00106	649	Multiplier Value to be used as a multiplier to obtain a new value	O R 1/10
Not Used	C00107	355	Unit or Basis for Measurement Code Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken	O ID 2/2
Not Used	C00108	1018	Exponent Power to which a unit is raised	O R 1/15
Not Used	C00109	649	Multiplier Value to be used as a multiplier to obtain a new value	O R 1/10
Not Used	C00110	355	Unit or Basis for Measurement Code Code specifying the units in which a value is being expressed, or manner in	O ID 2/2

Not Used	C00111	1018	which a measurement has been taken Exponent Power to which a unit is raised	O R 1/15
Not Used	C00112	649	Multiplier Value to be used as a multiplier to obtain a new value	O R 1/10
Not Used	C00113	355	Unit or Basis for Measurement Code Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken	O ID 2/2
Not Used	C00114	1018	Exponent Power to which a unit is raised	O R 1/15
Not Used	C00115	649	Multiplier Value to be used as a multiplier to obtain a new value	O R 1/10

Segment: **LM** Code Source Information
Position: 375
Loop: LM Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To transmit standard code list identification information
Syntax Notes:
Semantic Notes:
Comments: 1 LM02 identifies the applicable industry code list source information.
Notes: *Use the 2/LM/375 loop to identify coded information maintained in department or agency documentation.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	LM01	559	Agency Qualifier Code Code identifying the agency assigning the code values DF Department of Defense (DoD)	M ID 2/2
Not Used	LM02	822	Source Subqualifier A reference that indicates the table or text maintained by the Source Qualifier	O AN 1/15

Segment: **LQ** Industry Code
Position: 376
Loop: LM Optional
Level: Detail
Usage: Mandatory
Max Use: 100
Purpose: Code to transmit standard industry codes
Syntax Notes: 1 If LQ01 is present, then LQ02 is required.
Semantic Notes:
Comments:
Notes: *Use to identify codes, as appropriate, consistent with management information requirements.*

Data Element Summary

Ref.	Data	Name	Attributes
<u>Des.</u>	<u>Element</u>		
Must Use	LQ01	1270 Code List Qualifier Code	O ID 1/3
		Code identifying a specific industry code list	
		<i>Use one of codes 99 or A1 (but not both).</i>	
		83 Supply Condition Code	
		Classifies material by readiness for issue and use, describes actions underway to change the status of material, or identifies material as excess or not serviceable	
		<i>Use to identify supply condition of the material.</i>	
		99 Purpose Code	
		Codes that inform the material owner why an inventory balance is being reserved	
		A1 Ownership Code	
		Items included in the inventory records of an organization that is not the owner of the items	
Must Use	LQ02	1271 Industry Code	X AN 1/30
		Code indicating a code from a specific industry code list	

Segment: **LS** Loop Header
Position: 380
Loop: QTY Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To indicate that the next segment begins a loop
Syntax Notes:
Semantic Notes: 1 One loop may be nested contained within another loop, provided the inner nested loop terminates before the outer loop. When specified by the standard setting body as mandatory, this segment in combination with "LE", must be used. It is not to be used if not specifically set forth for use. The loop identifier in the loop header and trailer must be identical. The value for the identifier is the loop ID of the required loop segment. The loop ID number is given on the transaction set diagram in the appropriate ASC X12 version/release.
Comments: 1 See Figures Appendix for an explanation of the use of the LS and LE segments.
Notes: *Use as needed in each 2/QTY/320 loop to prevent a syntax error in the use of the 2/REF/390 loop.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	LS01	447	Loop Identifier Code The loop ID number given on the transaction set diagram is the value for this data element in segments LS and LE <i>Cite REF to indicate the 2/REF/390 loop.</i>	M AN 1/4

Segment: **REF** Reference Identification
Position: 390
Loop: REF Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To specify identifying information
Syntax Notes:

- 1 At least one of REF02 or REF03 is required.
- 2 If either C04003 or C04004 is present, then the other is required.
- 3 If either C04005 or C04006 is present, then the other is required.

Semantic Notes:

- 1 REF04 contains data relating to the value cited in REF02.

Comments:
Notes: *Use the 2/REF/390 loop to provide unique item tracking (UIT) information when inventories are segregated in this manner.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	REF01	128	Reference Identification Qualifier Code qualifying the Reference Identification	M ID 2/3
			BT Batch Number <i>Use to identify manufacturer's batch number or other number identifying the production run.</i>	
			LT Lot Number <i>Use to identify the manufacturer's lot number.</i>	
			SE Serial Number <i>Use to identify a unique item identifier.</i>	
Must Use	REF02	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	X AN 1/30
Not Used	REF03	352	Description A free-form description to clarify the related data elements and their content	X AN 1/80
Not Used	REF04	C040	Reference Identifier To identify one or more reference numbers or identification numbers as specified by the Reference Qualifier	O
Not Used	C04001	128	Reference Identification Qualifier Code qualifying the Reference Identification	M ID 2/3
Not Used	C04002	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	M AN 1/30
Not Used	C04003	128	Reference Identification Qualifier Code qualifying the Reference Identification	X ID 2/3
Not Used	C04004	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	X AN 1/30
Not Used	C04005	128	Reference Identification Qualifier Code qualifying the Reference Identification	X ID 2/3
Not Used	C04006	127	Reference Identification Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier	X AN 1/30

Segment: **DTM** Date/Time Reference
Position: 400
Loop: REF Optional
Level: Detail
Usage: Optional
Max Use: >1
Purpose: To specify pertinent dates and times
Syntax Notes: 1 At least one of DTM02 DTM03 or DTM06 is required.
2 If either DTM06 or DTM07 is present, then the other is required.
Semantic Notes:
Comments:
Notes: *Use multiple repetitions as needed to identify dates related to the UIT.*

Data Element Summary

	Ref. Des.	Data Element	Name	Attributes
Must Use	DTM01	374	Date/Time Qualifier Code specifying type of date or time, or both date and time 094 Manufacture <i>Use to identify the date of manufacture of the material identified.</i> 511 Shelf Life Expiration <i>Use to identify the shelf life expiration date.</i>	M ID 3/3
Must Use	DTM02	373	Date Date (YYMMDD)	X DT 6/6
Not Used	DTM03	337	Time Time expressed in 24-hour clock time as follows: HHMM, or HHMMSS, or HHMMSSD, or HHMMSSDD, where H = hours (00-23), M = minutes (00-59), S = integer seconds (00-59) and DD = decimal seconds; decimal seconds are expressed as follows: D = tenths (0-9) and DD = hundredths (00-99)	X TM 4/8
Not Used	DTM04	623	Time Code Code identifying the time. In accordance with International Standards Organization standard 8601, time can be specified by a + or - and an indication in hours in relation to Universal Time Coordinate (UTC) time; since + is a restricted character, + and - are substituted by P and M in the codes that follow	O ID 2/2
	DTM05	624	Century The first two characters in the designation of the year (CCYY)	O N0 2/2
Not Used	DTM06	1250	Date Time Period Format Qualifier Code indicating the date format, time format, or date and time format	X ID 2/3
Not Used	DTM07	1251	Date Time Period Expression of a date, a time, or range of dates, times or dates and times	X AN 1/35

Segment: **N1** Name
Position: 410
Loop: REF Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To identify a party by type of organization, name, and code
Syntax Notes: 1 At least one of N102 or N103 is required.
2 If either N103 or N104 is present, then the other is required.
Semantic Notes:
Comments: 1 This segment, used alone, provides the most efficient method of providing organizational identification. To obtain this efficiency the "ID Code" (N104) must provide a key to the table maintained by the transaction processing party.
2 N105 and N106 further define the type of entity in N101.
Notes: *Use to identify the manufacturer of the UIT item.*

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	N101	98	Entity Identifier Code Code identifying an organizational entity, a physical location, or an individual MF Manufacturer of Goods	M ID 2/2
Not Used	N102	93	Name Free-form name	X AN 1/35
Must Use	N103	66	Identification Code Qualifier Code designating the system/method of code structure used for Identification Code (67) 33 Commercial and Government Entity (CAGE)	X ID 1/2
Must Use	N104	67	Identification Code Code identifying a party or other code	X AN 2/20
Not Used	N105	706	Entity Relationship Code Code describing entity relationship	O ID 2/2
Not Used	N106	98	Entity Identifier Code Code identifying an organizational entity, a physical location, or an individual	O ID 2/2

Segment: **LE** Loop Trailer
Position: 440
Loop: QTY Optional
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To indicate that the loop immediately preceding this segment is complete
Syntax Notes:
Semantic Notes: 1 One loop may be nested contained within another loop, provided the inner nested loop terminates before the other loop. When specified by the standards setting body as mandatory, this segment in combination with "LS", must be used. It is not to be used if not specifically set forth for use. The loop identifier in the loop header and trailer must be identical. The value for the identifier is the loop ID of the required loop beginning segment. The loop ID number is given on the transaction set diagram in the appropriate ASC X12 version/release.
Comments: 1 See Figures Appendix for an explanation of the use of the LE and LS segments.
Notes: *Use in each 2/QTY/320 loop to terminate any 2/REF/390 loop iterations.*

Data Element Summary

Ref.	Data	Name	Attributes
<u>Des.</u>	<u>Element</u>		
Must Use	LE01	447 Loop Identifier Code	M AN 1/4
		The loop ID number given on the transaction set diagram is the value for this data element in segments LS and LE	
		<i>Repeat the content of 2/LS/380.</i>	

Segment: **N1** Name
Position: 450
Loop: N1 Optional (Must Use)
Level: Detail
Usage: Optional (Must Use)
Max Use: 1
Purpose: To identify a party by type of organization, name, and code
Syntax Notes: 1 At least one of N102 or N103 is required.
2 If either N103 or N104 is present, then the other is required.
Semantic Notes:
Comments: 1 This segment, used alone, provides the most efficient method of providing organizational identification. To obtain this efficiency the "ID Code" (N104) must provide a key to the table maintained by the transaction processing party.
2 N105 and N106 further define the type of entity in N101.
Notes: *Must use this 2/N1/450 loop to identify the organization to receive the transaction.*

Data Element Summary

	Ref.	Data	Name	Attributes
	Des.	Element		
Must Use	N101	98	Entity Identifier Code Code identifying an organizational entity, a physical location, or an individual SB Storage Area <i>Must use to indicate the storage organization.</i>	M ID 2/2
Not Used	N102	93	Name Free-form name	X AN 1/35
Must Use	N103	66	Identification Code Qualifier Code designating the system/method of code structure used for Identification Code (67) 1 D-U-N-S Number, Dun & Bradstreet 9 D-U-N-S+4, D-U-N-S Number with Four Character Suffix 10 Department of Defense Activity Address Code (DODAAC) M4 Department of Defense Routing Identifier Code (RIC) An integral and predetermined participant in an established logistical system performing general logistic control, distribution, and storage functions	X ID 1/2
Must Use	N104	67	Identification Code Code identifying a party or other code	X AN 2/20
Not Used	N105	706	Entity Relationship Code Code describing entity relationship	O ID 2/2
Must Use	N106	98	Entity Identifier Code Code identifying an organizational entity, a physical location, or an individual TO Message To <i>Must use to indicate that the organization cited in N104 is receiving the transaction.</i>	O ID 2/2

Segment: **SE** Transaction Set Trailer
Position: 020
Loop:
Level: Summary
Usage: Mandatory
Max Use: 1
Purpose: To indicate the end of the transaction set and provide the count of the transmitted segments (including the beginning (ST) and ending (SE) segments)

Syntax Notes:

Semantic Notes:

Comments: 1 SE is the last segment of each transaction set.

Data Element Summary

	<u>Ref.</u> <u>Des.</u>	<u>Data</u> <u>Element</u>	<u>Name</u>	<u>Attributes</u>
Must Use	SE01	96	Number of Included Segments Total number of segments included in a transaction set including ST and SE segments	M N0 1/10
Must Use	SE02	329	Transaction Set Control Number Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set <i>Cite the same number as the one cited in ST02</i>	M AN 4/9

NIST Technical Publications

Periodical

Journal of Research of the National Institute of Standards and Technology—Reports NIST research and development in those disciplines of the physical and engineering sciences in which the Institute is active. These include physics, chemistry, engineering, mathematics, and computer sciences. Papers cover a broad range of subjects, with major emphasis on measurement methodology and the basic technology underlying standardization. Also included from time to time are survey articles on topics closely related to the Institute's technical and scientific programs. Issued six times a year.

Nonperiodicals

Monographs—Major contributions to the technical literature on various subjects related to the Institute's scientific and technical activities.

Handbooks—Recommended codes of engineering and industrial practice (including safety codes) developed in cooperation with interested industries, professional organizations, and regulatory bodies.

Special Publications—Include proceedings of conferences sponsored by NIST, NIST annual reports, and other special publications appropriate to this grouping such as wall charts, pocket cards, and bibliographies.

National Standard Reference Data Series—Provides quantitative data on the physical and chemical properties of materials, compiled from the world's literature and critically evaluated. Developed under a worldwide program coordinated by NIST under the authority of the National Standard Data Act (Public Law 90-396). NOTE: The Journal of Physical and Chemical Reference Data (JPCRD) is published bimonthly for NIST by the American Chemical Society (ACS) and the American Institute of Physics (AIP). Subscriptions, reprints, and supplements are available from ACS, 1155 Sixteenth St., NW, Washington, DC 20056.

Building Science Series—Disseminates technical information developed at the Institute on building materials, components, systems, and whole structures. The series presents research results, test methods, and performance criteria related to the structural and environmental functions and the durability and safety characteristics of building elements and systems.

Technical Notes—Studies or reports which are complete in themselves but restrictive in their treatment of a subject. Analogous to monographs but not so comprehensive in scope or definitive in treatment of the subject area. Often serve as a vehicle for final reports of work performed at NIST under the sponsorship of other government agencies.

Voluntary Product Standards—Developed under procedures published by the Department of Commerce in Part 10, Title 15, of the Code of Federal Regulations. The standards establish nationally recognized requirements for products, and provide all concerned interests with a basis for common understanding of the characteristics of the products. NIST administers this program in support of the efforts of private-sector standardizing organizations.

Order the following NIST publications—FIPS and NISTIRs—from the National Technical Information Service, Springfield, VA 22161.

Federal Information Processing Standards Publications (FIPS PUB)—Publications in this series collectively constitute the Federal Information Processing Standards Register. The Register serves as the official source of information in the Federal Government regarding standards issued by NIST pursuant to the Federal Property and Administrative Services Act of 1949 as amended, Public Law 89-306 (79 Stat. 1127), and as implemented by Executive Order 11717 (38 FR 12315, dated May 11, 1973) and Part 6 of Title 15 CFR (Code of Federal Regulations).

NIST Interagency or Internal Reports (NISTIR)—The series includes interim or final reports on work performed by NIST for outside sponsors (both government and nongovernment). In general, initial distribution is handled by the sponsor; public distribution is handled by sales through the National Technical Information Service, Springfield, VA 22161, in hard copy, electronic media, or microfiche form. NISTIR's may also report results of NIST projects of transitory or limited interest, including those that will be published subsequently in more comprehensive form.

U.S. Department of Commerce
National Institute of Standards
and Technology
Gaithersburg, MD 20899-0001

Official Business
Penalty for Private Use \$300